

Claims

Applicants present the following listing of claims pursuant to 37 CFR § 1.121(c):

Listing of claims

1-3. (canceled)

4. (Currently Amended) ~~The method of claim 2~~ In a network of computing devices interoperating via a peer networking protocol, a method of peer networking protocol hosting for a group of logical devices, the method comprising:

in a peer networking host having an implementation of the peer networking protocol, providing an application programming interface for a software program that implements a logical device having a set of device services to obtain peer network protocol hosting of the logical device and its device services from the peer networking host, the software program providing descriptive data of the hosted logical device and its device services to the peer networking host via the application programming interface;

proxying service control requests per the peer networking protocol from the network directed to the device services of the hosted logical device within the peer networking host, wherein the peer networking host invokes the respective device service responsive to a particular service control request, wherein the proxying of the service control requests further comprises:

converting the service control requests from the peer networking protocol into an invocation per an object automation protocol to the respective device service; and

issuing the invocation on a run-time dispatching interface of a programming object implementing the device service, ~~the method further comprising;~~

communicating events sourced from the hosted logical device by the peer networking host to the network in accordance with the peer networking protocol;

converting a service description conforming to the peer networking protocol of a device service of the logical device into an interface definition language description of the run-time dispatching interface per the object automation protocol;

compiling the run-time dispatching interface of the programming object from the interface definition language description;

whereby proxying of the service control requests per the peer networking protocol based on the service description into invocations issued to the run-time dispatching interface is facilitated.

5-24. (canceled)

25. (Original) In a computing network, a method of interoperating between peer networking devices using a peer networking service control protocol and a software-provided logical device on a computer, the method comprising:

describing a service of the software-provided logical device in a service description according to a service description language of the peer networking service control protocol;
converting the service description into an interface definition in an interface description language;

building a programming object implementing the service;
compiling an interface of the programming object from the interface definition;
in response to a description request in the peer networking service control protocol, serving the service description to a requesting peer networking device; and
in response to a service control request in the peer networking service control protocol from the requesting peer networking device, issuing an invocation to the interface of the programming object to thereby invoke the service of the software-provided logical device.

26. (Original) The method of claim 25 wherein the compiling comprises compiling the interface definition into a run-time dispatch interface on the programming object.

27. (New) A computing device having a software-provided logical device and interoperating between peer networking devices in a computing network using a peer networking service control protocol, the computing device comprising:

means for describing a service of the software-provided logical device in a service description according to a service description language of the peer networking service control protocol;

means for converting the service description into an interface definition in an interface description language;

means for building a programming object implementing the service;
means for compiling an interface of the programming object from the interface definition;
means for, in response to a description request in the peer networking service control protocol, serving the service description to a requesting peer networking device; and
means for, in response to a service control request in the peer networking service control protocol from the requesting peer networking device, issuing an invocation to the interface of the programming object to thereby invoke the service of the software-provided logical device.

28. (New) The computing device of claim 27 wherein the means for compiling comprises means for compiling the interface definition into a run-time dispatch interface on the programming object.

29. (New) A computer-readable data-carrying medium having a software program encoded thereon and executable on a computer in a computing network of peer networking devices to perform a method of interoperating between the peer networking devices using a peer networking service control protocol and a software-provided logical device on the computer, the method comprising:

describing a service of the software-provided logical device in a service description according to a service description language of the peer networking service control protocol;
converting the service description into an interface definition in an interface description language;
building a programming object implementing the service;
compiling an interface of the programming object from the interface definition;
in response to a description request in the peer networking service control protocol, serving the service description to a requesting peer networking device; and
in response to a service control request in the peer networking service control protocol from the requesting peer networking device, issuing an invocation to the interface of the programming object to thereby invoke the service of the software-provided logical device.

30. (New) The computer-readable data carrying medium of claim 29 wherein the compiling comprises compiling the interface definition into a run-time dispatch interface on the programming object.